

d.) Remarks

In the current rejection, a primary reference is the Lee patent, which describes a wireless device for capturing coordinate shift information. It's relevant teaching is the use of multiple coils 20 to surround a working surface 10 and generate a magnetic field that may power a device such as a wireless mouse 100. Note however that Lee provides a matrix of conductors in Cartesian layout to receive pulses from the mouse and determine its position. This latter feature is quite distinct from the position sensing methods of the present invention.

A secondary reference in the rejection of claims is the Ronkka patent, which describes a system for transferring information between a pointer and a display interface. The rejection cites Ronkka for a showing of a conductive layer 42, as well as the use of spread spectrum signals, ostensible described in col. 5, lines 59-67. However, component 42 of Ronkka is NOT a conductive layer, but rather "a transmit and receive antenna 42 under the display's surface 41 and the LCD display unit 43." (col. 4, lines 58-60). In addition, the cited col. 5, lines 59-67 makes no mention of spread spectrum signals or any other form of signals. Indeed, col. 5, lines 30-32 state that, "Any method known per se can be used for the modulation, e.g. frequency modulation (FM), pulse code modulation (PCM), or quadrature phase shift keying (QPSK)." Note that spread spectrum is specifically excluded from this list. Thus the Ronkka reference fails as a reference under §102, and is, moreover, insufficient as a §103 reference.

Another secondary reference, Katsurahira, is cited for a showing of rectifying means in a pointer device for generating operating power for active

touch stimulation of a position sensing apparatus. This teaching is acknowledged. However, Katsurahira is combined with the Lee reference to reject claim 4. Given that the Lee device employs a resonant antenna arrangement with differing LC resonant combinations to indicate different button actuations, why would anyone skilled in the art introduce a rectifying means in Lee, when it is (a) not needed, and, (b) detrimental to the functioning of the resonant circuit arrangement?

A further secondary reference, Meadows, is cited for a showing of a conductive layer and a pair of contact points for acquiring a differential voltage from a voltage gradient in the conductive layer. Meadows does NOT show this feature at all. Rather, Meadows describes a stylus that makes contact at a single contact point 46 on a conductive layer which has a uniform distributed resistance. The stylus (or finger of the user) has a capacitance that draws current from a square wave applied to bar electrodes at the margins of the conductive layer, and the current drawn through the resistance of the conductive layer provides an opportunity to calculate the two partial resistances in the Cartesian directions and derive the position therefrom. Meadows does not employ two contact points that contact a conductive layer to acquire an operating voltage from a voltage gradient applied to the conductive layer. A single contact point cannot span a voltage gradient!

To further point out the distinctions of the present invention over the prior art, as noted above, the claims have been significantly amended. Claim 1, which recites a touch sensing area and a transducer for transmitting a power signal to at least one active touch stimulating device, now also recites that the touch

stimulating device includes touch signaling means that incorporates spread spectrum signals. As noted in the discussion above, the Ronkka patent, which is cited for a showing of the use of spread spectrum signals in a similar touch sensing system, actually makes no mention of spread spectrum signals for this purpose. Indeed, Ronkka lists a few signal formats and omits mentioning spread spectrum techniques, thus teaching away from that feature. Since there is no such teaching in the reference, nor in the other citations, it is submitted that this added limitation renders the claim patentable over the art. Claims 2-5 depend from claim 1, and are likewise patentable. Old claim 6, which contained the spread spectrum limitation, has now been canceled.

Claim 13 has been amended to include a recitation of the pair of contact points of the touch stimulating device to engage the recited conductive layer, the points being movable on the conductive layer and spaced apart to acquire a voltage differential from the voltage gradient in the conductive layer. The rejection cites the Meadows patent in rejecting this feature, but a close reading of Meadows reveals that it employs a single contact point that is associated with a resistance divider location scheme. Since Meadows is the only reference that is cited to show this feature, and it fails completely to describe any sort of two contact device, it is clear that the addition of this limitation to claim 13 renders it patentable. Claim 16, which has been amended to depend from claim 13, and claim 17, which also depends from claim 13, are likewise patentable.

Claim 18 has been amended in a manner similar to claim 1, in that it now recites the use of spread spectrum signals for touch signaling. Due to the

deficiencies of the Ronkka patent noted above, this newly added limitation renders claim 18 allowable over the art.

Claim 19 is a method claim that relates to the conductive layer embodiment of the invention. It has been amended in a manner similar to claim 13, in that it now recites the provision of a touch stimulating device having a pair of contacts movable on the conductive layer and disposed to pick up a voltage differential from the EM field in the conductive layer. Since the Meadows patent fails as a reference in regard to this feature, it is clear that claim 19 should be allowed.

Claim 21 has been amended to depend from claim 19, and is likewise allowable.

All claims now presented are submitted in the belief that they are allowable over the art, and that this application in condition for issuance. Action toward that end is earnestly solicited.

No new fee is required by this amendment.

Respectfully Submitted,



Harris Zimmerman, Esq.
Registration No. 16, 437
Attorney for Applicant
Law Offices of Harris Zimmerman
1330 Broadway, Suite 710
Oakland, California 94612
(510) 465-0828

I hereby certify that this correspondence is being deposited with the U.S. Postal Service as properly posted first class mail in an envelope addressed to: Mail Stop Non-Fee Amendment, Commissioner of Patents, P.O. Box 1450 Alexandria, VA 22313-1450, on

date